

ABSTRACT OF THE DISCLOSURE

ELECTRICAL CONNECTOR WITH TERMINAL POSITION ASSURANCE DEVICE

An electrical connector includes a housing having a front mating end, a rear terminating end and at least one terminal-receiving passage extending in a direction defining an insertion axis extending between the ends. The passage has a rear open end communicating with the rear terminating end of the housing. A TPA device is engageable with the housing at the front mating end thereof in a pre-load position. The TPA device includes a through passage communicating with the terminal-receiving passage in the housing. The TPA device is movable rearwardly from the pre-load position to a locking position. A terminal is insertable through the rear terminating end of the housing into the rear open end of the terminal-receiving passage along the insertion axis and into the through passage in the TPA device. The terminal moves conjointly with the TPA device from the pre-load position to the locking position. A terminal lock includes a locking surface on the housing at the terminal-receiving passage engageable with the locking shoulder on the terminal. Complementary interengaging ramp surfaces are provided between the TPA device and the housing and extend at an angle to the insertion axis for moving the locking shoulder of the terminal transversely of the axis onto the locking surface on the housing as the TPA device and the terminal move conjointly from the pre-load position to the locking position angularly of the axis.